

ABSTRACT

This document discloses systems and methods for enabling viewers to control and manage programming and to control external consumer electronic devices through the use of a STB or other device. This invention provides command information that is embedded into an EPG signal and transmitted from a headend or transmission facility through a distribution network to the end user. By way of example, the program data includes volume, lighting, internet or environmental tag information for controlling external devices, such as a surround sound entertainment system, home environment system, personal computer, etc. A set top box or other properly configured consumer electronics device either receives data from the external device to effect programming or transmits data to the external device to optimize the viewing experience or to supplement information produced by the EPG.